

CLAIMS

1. (Previously presented) An information providing apparatus comprising:
image display means mounted on a mobile object, presenting an image display of information which assists travel of the mobile object;
vibration detecting means for detecting vibration produced on said image display means, determining whether the detected vibration is not smaller than a static, predetermined level defined prior to said vibration being detected, and sending a detection output signal when said vibration is determined to be not smaller than said predetermined level, said predetermined level being greater than an absence of vibration; and
operation control means for:
modifying a display mode of said information presented in the image display by said image display means from a first display mode to a second display mode, when receipt of said detection output signal over a predetermined duration of positive length indicates that the vibration of not smaller than said predetermined level produced on said image display means sustains over the predetermined duration; and
modifying the display mode of said information presented in the image display by said image display means from the second display mode to the first display mode when an absence of output of said detection output signal is detected over a predetermined duration of positive length.

2. (Previously presented) The information providing apparatus as claimed in Claim 1, wherein said operation control means takes part in a control of increasing luminance of a display screen on which said information is presented in the image display in said image display means, when the detection output signal is received from said vibration detecting means over the predetermined duration.

3. (Previously presented) The information providing apparatus as claimed in Claim 1, wherein said operation control means takes part in a control of enlarging images corresponded to mark information and character information contained in said information presented in the image

display by said image display means, when the detection output signal is received from said vibration detecting means over the predetermined duration.

4. (Previously presented) The information providing apparatus as claimed in Claim 1, wherein said operation control means takes part in a control of increasing difference in contrast between an image of high importance and an image of low importance contained in said information presented in the image display by said image display means, when the detection output signal is received from said vibration detecting means over the predetermined duration.

5. (Original) The information providing apparatus as claimed in Claim 1, wherein:
said mobile object is a vehicle, and
said image display means is configured so as to present image display of a road map image having a current position of said vehicle and an image expressing a travel route superposed therein, as said information.

6. (Previously presented) A method of providing information allowing image display of information which assists travel of a mobile object on an image display section of an information providing apparatus mounted on said mobile object, the method comprising:

defining a static, predetermined vibration level that is greater than an absence of vibration;
subsequent to the defining, detecting vibration produced on said image display section;
determining whether said detected vibration is not smaller than the predetermined vibration level;

sending a detection output signal when said vibration is not smaller than said predetermined vibration level;

modifying a display mode of said information presented as an image display by said image display section from a first display mode to a second display mode, when receipt of said detection output signal over a predetermined duration of positive length indicates that the vibration of not smaller than said predetermined vibration level produced on said image display section sustains over the predetermined duration; and

modifying the display mode of said information presented as an image display by said image display section from the second display mode to the first display mode when an absence of output of said detection output signal is determined over a predetermined duration of positive length.

7. (Currently amended) An information providing apparatus comprising:
an image display section mounted on a mobile object, presenting an image display of information which assists travel of the mobile object;
a vibration detecting section that detects vibration produced on said image display section, determines whether the detected vibration is not smaller than a static, predetermined level defined prior to said vibration being detected, and sends a detection output signal when said vibration is determined to be not smaller than said predetermined level, said predetermined level being greater than an absence of vibration; and

an operation control section that:

modifies a display mode of said information presented in the image display by said image display section from a first display mode to a second display mode, when receipt of said detection output signal over a predetermined duration of positive length indicates that the vibration of not smaller than said predetermined level produced on said image display section sustains over the predetermined duration; and

~~modifying~~ modifies the display mode of said information presented in the image display by said image display section from the second display mode to the first display mode when an absence of output of said detection output signal is detected over a predetermined duration of positive length.

8. (New) The information providing method as claimed in Claim 6, wherein modifying the display mode from the first display mode to the second display mode comprises increasing luminance of a display screen on which said information is presented in the image display in said image display means.

9. (New) The information providing method as claimed in Claim 6, wherein modifying the display mode from the first display mode to the second display mode comprises enlarging images corresponded to mark information and character information contained in said information presented in the image display by said image display means.

10. (New) The information providing method as claimed in Claim 6, wherein modifying the display mode from the first display mode to the second display mode comprises increasing difference in contrast between an image of high importance and an image of low importance contained in said information presented in the image display by said image display means.

11. (New) The information providing method as claimed in Claim 6, wherein:
said mobile object is a vehicle, and
said image display means is configured so as to present image display of a road map image having a current position of said vehicle and an image expressing a travel route superposed therein, as said information.

12. (New) The information providing apparatus of claim 7, wherein said operation control section takes part in a control of increasing luminance of a display screen on which said information is presented in the image display in said image display section, when the detection output signal is received from said vibration detecting section over the predetermined duration.

13. (New) The information providing apparatus as claimed in Claim 7, wherein said operation control section takes part in a control of enlarging images corresponded to mark information and character information contained in said information presented in the image display by said image display section, when the detection output signal is received from said vibration detecting section over the predetermined duration.

14. (New) The information providing apparatus as claimed in Claim 7, wherein said operation control section takes part in a control of increasing difference in contrast between an

image of high importance and an image of low importance contained in said information presented in the image display by said image display section, when the detection output signal is received from said vibration detecting section over the predetermined duration.

15. (New) The information providing apparatus as claimed in Claim 7, wherein:
said mobile object is a vehicle, and
said image display section is configured so as to present image display of a road map image having a current position of said vehicle and an image expressing a travel route superposed therein, as said information.